



Monterey Bay National Marine Sanctuary

Sanctuary Office Report



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A REPORT FOR THE SANCTUARY ADVISORY COUNCIL MEMBERS

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ABOUT THE SANCTUARY

Designated in 1992, Monterey Bay National Marine Sanctuary (MBNMS or Sanctuary) is a federally protected marine area offshore of California's central coast. Stretching from Marin to Cambria, MBNMS encompasses a shoreline of 276 miles and 6,094 square statute miles of ocean.

Supporting one of the world's most diverse marine ecosystems, it is home to numerous mammals, seabirds, fishes, invertebrates and plants in a remarkably productive coastal environment. MBNMS was established for the purpose of resource protection, research, education and public use of this national treasure.

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION (NOAA) AND OFFICE OF NATIONAL MARINE SANCTUARIES (ONMS) NEWS

Areas in Wisconsin and Maryland identified as possible national marine sanctuaries

During the 2015 Our Ocean Conference in Valparaiso, Chile, President Barack Obama today announced that, for the first time since 2000, two new national marine sanctuaries have been identified by NOAA for possible designation under the National Marine Sanctuaries Act. NOAA is now seeking comment on the proposals.

In Wisconsin, an 875-square mile area of Lake Michigan, with waters extending from Port Washington to Two Rivers received tremendous support from the community, and was identified for possible designation. The nominated area contains a collection of 39 known shipwrecks, 15 of which are listed on the National Register of Historic Places.

Mallows Bay in Maryland is a 14-square mile area of the tidal Potomac River, adjacent to Charles County. Nearly 200 vessels spanning from the Revolutionary War through the present are found in the area, including the remains of the largest "Ghost Fleet" of World War I wooden steamships built for the U.S. Emergency Fleet, which are listed on the National Register

of Historic Places. <http://sanctuaries.noaa.gov/news/press/2015/areas-identified-as-possible-national-marine-sanctuaries.html>

NOAA's new Climate Science Strategy aims to reduce effects of climate change on fisheries and living marine resources

Forecasters at NOAA's Climate Prediction Center issued the U.S. Winter Outlook today favoring cooler and wetter weather in Southern Tier states with above-average temperatures most likely in the West and across the Northern Tier. This year's El Niño, among the strongest on record, is expected to influence weather and climate patterns this winter by impacting the position of the Pacific jet stream.

"A strong El Niño is in place and should exert a strong influence over our weather this winter," said Mike Halpert, deputy director, NOAA's Climate Prediction Center. "While temperature and precipitation impacts associated with El Niño are favored, El Niño is not the only player. Cold-air outbreaks and snow storms will likely occur at times this winter. However, the frequency, number and intensity of these events cannot be predicted on a seasonal timescale."

<http://www.noaaneews.noaa.gov/stories2015/101515-noaa-strong-el-nino-sets-the-stage-for-2015-2016-winter-weather.html>

Study unlocks faster way to assess ocean ecosystem health

A new study published today identifies a set of features common to all ocean ecosystems that provide a visual diagnosis of the health of the underwater environment coastal communities rely on. Together, the features detail cumulative effects of threats — such as overfishing, pollution, and invasive species — so responders can act quickly to increase ocean resilience and sustainability.

"Until now, we've had to look at the condition of different species and habitats individually. Having an easy-to-adopt approach that gives us a good idea of what is happening to the ecosystem as a whole — not just a piece of it — and anywhere on the planet, is a giant leap forward in managing marine ecosystems," said Richard Merrick, Ph.D., NOAA Fisheries director of scientific programs and chief science advisor. "It's similar to giving a doctor the ability to look at a person's whole body and treat an illness, not just its symptoms." <http://www.noaaneews.noaa.gov/stories2015/111015-study-unlocks-faster-way-to-assess-ocean-ecosystem-health.html>

NATIONAL MARINE SANCTUARY NEWS

PMNM Scientists Discover Probable New Species on Unexplored Seamounts in the NWHI

On September 30, PMNM scientists returned from doing research exploring the slopes of seamounts in the NWHI from September 3-30 aboard NOAA ship *Hi'ialakai*. These volcanic seamounts rise from the ocean floor in 14,000 feet, and come to within 200 to 300 feet of the surface. These depths are only accessible to divers using mixed gas rebreathers. The unsheltered open-ocean setting, dozens of miles from the nearest island or emergent reef, made surface conditions challenging. At Pioneer Bank (900 nautical miles NW of Honolulu), scientists discovered probable new species of fishes, including an unidentified seahorse and an unidentified dragonet fish. Both are very likely new to science. A press event upon the return of the expedition resulted in international coverage, including the front page feature in the Honolulu Star-Advertiser. Supporting PMNM's mission to characterize the deep-water habitats of the Monument; PMNM rebreather divers continue to make discoveries that increase the known biodiversity of the NWHI; these discoveries underscore how poorly explored deep coral reef ecosystems are.

Three new shipwreck discoveries in Greater Farallones National Marine Sanctuary

During an 8-day maritime heritage expedition on board the R/V *Fulmar* in Greater Farallones National Marine Sanctuary, three new shipwrecks were discovered. The major discovery was the steam trawler *Ituna* lost 95 years ago. At 170 feet in length, it was the largest steam trawler fishing out of San Francisco and one of the first to utilize the Otter trawl system in the Pacific. *Ituna* was built in Glasgow, Scotland in 1886 as a luxury steam yacht and designed by George Lennox Watson, a famous yacht designer in Scotland. The yacht went on to serve as an expedition ship during some of the earliest archaeological field studies in the Yucatan, Chiapas, and Oaxaca. Before being transformed into a steam trawler, *Ituna* was converted to a first-class passenger-cargo steamer running between Mexican and U.S. Pacific ports for the Mexican Navigation and Commercial Company. On March 13, 1920, while under ownership of the Frank E. Booth Company, the 34-year old trawler *Ituna* was en route from San Francisco to Reedsport, Oregon when a gale hit and spit its seams. While 12 of its 14 crewmen escaped, two went down with the vessel when it sank in a matter of minutes. The shipwreck was found sitting upright on the seafloor and was easily identified by its iron clipper bow and ecliptic stern rising off the seafloor. Two additional discoveries included a 167 foot fuel barge and a commercial fishing trawler lost in more recent years. The science team also conducted remotely operated vehicle (ROV) and autonomous underwater vehicle (AUV) surveys on shipwrecks discovered during the phase one expedition in September 2014. The objective of the maritime heritage R/V *Fulmar* ROV-AUV phase II survey was to conduct an archaeological site characterization of maritime heritage resources, including ship and aircraft wrecks in Greater Farallones National Marine Sanctuary. James Delgado and Robert Schwemmer served as Co-principal investigators working with staff from GFNMS, CBNMS, west coast region office, federal and state partners, and volunteers, in partnership with Teledyne SeaBotix, Inc. Teledyne provided a pilot to operate the SeaBotix ROV and an AUV to collect high definition video footage, still images and side scan sonar data for analysis. The mission is to support Maritime Heritage Program's Maritime Cultural Landscape initiative through targeted research on West Coast sites, in particular, Greater Farallones National Marine Sanctuary and the newly expanded region that extends north of Point Arena, California. NOAA's Office of National Marine Sanctuaries collaborated with federal and state agencies, as well as the private sector for this mission to document resources and to create opportunities to locate and record submerged archaeological resources. These studies provide a foundation for an inventory and enhanced public awareness about the historic resources located in Greater Farallones National Marine Sanctuary.

November Water Quality Cruise Completed

The FGBNMS research team, along with the RV Manta crew, completed a multi-purpose cruise to the Flower Garden Banks November 3-4, 2015. The FGBNMS team conducted quarterly water sampling, water quality instrument downloads and maintenance, and lionfish collections.

Water samples collected quarterly from the sea surface to the reef cap at EFGB and WFGB are analyzed for chlorophyll *a* and nutrients (ammonia, nitrate, nitrite, soluble reactive phosphorous and total Kjeldahl nitrogen). At Stetson Bank, photographs at repetitive monitoring stations were taken to document seasonal variations in macroalgae cover. At West Flower Garden Bank, sea urchin and lobster surveys were conducted in the long-term monitoring study site. Divers were treated to cool 78 degree water temperatures, but otherwise excellent conditions on the reef, with several tiger shark and

manta ray observations. Long-term monitoring programs at FGBNMS help document long-term changes and help aid management decisions protecting the reef communities and fish populations they support.



MONTEREY BAY NATIONAL MARINE SANCTUARY NEWS AND PROGRAM UPDATES



MANAGEMENT

Monterey Bay National Marine Sanctuary Holds Advisory Council Meeting

On October 23rd, the MBNMS Advisory Council met and received a series of presentations and updates on the southern region of MBNMS, water quality and wildlife disturbance current issues and response actions. The next Advisory Council meeting will be on December 11th in Monterey. Sanctuary Advisory Councils are community-based advisory bodies consisting of representatives from various user groups, government agencies and the public at large. The role of the council is to provide advice to the sanctuary superintendent on the designation and/or operation of a national marine sanctuary.

RESEARCH AND MONITORING

Beach COMBERS volunteer training and appreciation event October 10th

Beach COMBERS (Coastal Ocean Mammal / Bird Education and Research Surveys) training will occur on Saturday October 10th from 9:00 am – 4:00 pm. at Moss Landing Marine Laboratories. The training is geared toward new volunteers that are interested in joining the Beach COMBERS team. Seasoned COMBERS are encouraged to attend to strengthen their skills. In the evening, seasoned volunteers will be celebrated with an appreciation dinner while hearing about recent data. Volunteers will also pick up supplies including new data sheets that were recently created to streamline the data collection process. Since 1997, trained volunteers have surveyed beached marine birds and mammals monthly at selected sections of beaches throughout the Monterey Bay area, with the specific goal of using deposition of beach cast carcasses as an index of the health of the sanctuary. On average, the Beach COMBERS detect two events per year, where baseline numbers of dead organisms are significantly surpassed. These could be natural events (e.g., a low productivity year for food) or human caused (e.g., an oil spill). For more information on the program see:

<http://www.sanctuarysimon.org/monterey/sections/beachCombers/index.php?l=n>.

Sanctuary Marine Biodiversity Observation Network (MBON) Updates

The Marine Biodiversity Observation Network (MBON) demonstration project in the Monterey Bay and Florida Keys National Marine Sanctuaries held its second all-hands meeting at the Monterey Bay Aquarium Research Institute (MBARI) from October 13th-15th. The goal of this 5-year MBON project is to provide an integrated picture of the current status and recent changes in biodiversity within the diverse habitats of the national marine sanctuaries. The Monterey Bay and Florida Keys research groups provided exciting updates on many topics including: satellite-based tracking of the distribution of pelagic habitats or 'seascapes'; standardizing methods for environmental DNA collection and analysis across many taxonomic groups and habitats; long-term trends in biodiversity of forage species off central California; and technology to integrate biodiversity data and make real-time data products for scientist and resource managers. The Monterey/Florida MBON group was joined by lead scientists from the two other U.S. MBON projects, the Santa Barbara Channel MBON and the Arctic MBON. Working toward the goal of an operational national network of marine biodiversity observatories, the three MBON projects discussed opportunities for collaboration on data collection, analysis, and synthesis. In addition, the group discussed opportunities for coordinated participation in international working groups on biodiversity observing and examples of early successes and case studies from the current U.S. efforts. National marine sanctuaries are an ideal setting to develop and evaluate a biodiversity observation network because these areas encompass a wide range of marine environments with a high density of research and monitoring efforts, as well as nearby coastal communities that depend on the ocean for business and recreation. The three MBON demonstration projects will help us better track the health marine ecosystems nation-wide and serve as a potential model for improving world-wide biodiversity observing capabilities.

Marine Mammal Aerial Surveys over Davidson Seamount Completed

During the week of October 26, trained observers from Monterey Bay and Greater Farallones National Marine Sanctuaries and Moss Landing Marine Laboratories conducted three aerial surveys for marine mammals over and near the Davidson Seamount, a pristine undersea mountain habitat off the coast of Central California and was added to MBNMS in 2009. This survey, launched aboard the NOAA Twin Otter, has been designed to detect any differences in marine mammal abundance, density and diversity as a function of distance from the seamount and the shoreline of California. Aerial surveys are an ideal method to reach remote locations and cover large areas in short periods of time compared to standard ship surveys. The

Twin Otter was the platform choice because of its fast speed, great viewing windows, and expert crew. Marine mammal counts were low (due to seasonality) along 1,200 kilometers of transect, covering an estimated observer footprint of 2,500 square kilometers. Highlights included the observation of hammerhead sharks, humpback whales and *Mola mola*. This survey will detect any differences in marine mammal abundance, density and diversity as a function of distance from the seamount and the shoreline of California, as well as note other sightings such as location and types of vessels and marine debris. Access to NOAA planes is critical for this type of research in MBNMS.

SIMoN Staff Successfully Survey Kelp Forest Sites in Big Sur Using the R/V FULMAR

From October 20 to 22, SIMoN staff and UC Santa Cruz research divers completed surveys at six sites as part of the Big Sur Nearshore Characterization (BSNC) project using the R/V FULMAR. The 3-day trip allowed divers to survey areas within the 70-mile stretch of coastline actively managed for landslides by CalTrans. Bottom time for six divers totaled over 37 hours across 50 dives. This project builds upon marine resources surveys initially conducted from 2003 to 2005 as part of the Coast Highway Management Plan (CHMP) for Highway 1 in Big Sur.

RESOURCE PROTECTION

Santa Rita Creek Growers Meeting

The MBNMS agricultural and urban water quality coordinators, Resource Conservation District Monterey County, and Central Coast Preservation Inc. met with growers in the Santa Rita Creek watershed to present information on sediment and runoff control measures that could increase infiltration to the aquifer, reduce soil erosion, reduce downstream flooding potential, and improve water quality. During the predicted El Nino event, there is increased need to apply erosion control and water management practices. This educational meeting included using cover crops in furrows as a management practice that can reduce runoff and increase infiltration. Working collaboratively with partners and growers in the region can help improve water quality from agricultural runoff and help reduce pollution from the watersheds that contribute to the Monterey Bay National Marine Sanctuary. El Nino represents increased potential for water capture and infiltration, provided management practices are installed by growers.

Western SARE Professional Grant Completed

The MBNMS was awarded a two year Western SARE grant for compiling tools and building professional technical capacity for irrigation and nutrient management on California's Central Coast. The grant involved compiling online toolkits with information, education and practice guidelines, which were posted on the AWQA webpage at <http://www.awqa.org/toolkits/>. Two cross training events with participation from Resource Conservation Districts, grower organizations, private consultants, NRCS, and educators were conducted in the spring of 2015. The primary goal of the grant was accomplished, which was to increase professional technical capacity to serve growers through in-field cross-trainings and distribution of materials. Creating easy access to technical information and building technical capacity in the region can help us work better and smarter to improve water quality from agricultural runoff and help reduce pollution from the watersheds that contribute to the Monterey Bay National Marine Sanctuary.

Areas of Special Biological Significance (ASBS) Mooring Field Monitoring Ends for 2015

September 20th was the final day for ASBS monitoring in the mooring field at Stillwater Cove in Pebble Beach. Summertime mooring field monitoring has been conducted in 2014 and 2015 to determine if any pollutants are entering the Stillwater Cove and the Monterey Bay National Marine Sanctuary from boats moored in the cove. Monitoring was conducted on the Sunday or Monday of busy boating weekends at Stillwater Cove. Samples were collected for analysis of bacteria, oils, grease, chlorine, ammonia, copper and zinc. ASBS monitoring over the past two years has included storm and receiving water monitoring, reference site monitoring and mooring field monitoring. Determining sources of pollutants entering the ocean and the Monterey Bay National Marine Sanctuary is the first step in prevention. Mooring field monitoring as well as other monitoring for the ASBS program further informs the determination of natural water quality as well as identifying sources of pollutants.

WQPP Team Meets with Local Cities

WQPP team members Lisa Emanuelson and Pam Krone-Davis met with local Monterey Regional Storm Water Management Plan (MRSWMP) cities to discuss results of the MRSWMP data analysis that analyzed 14 years of Dry Run

and First Flush data including years prior to MRSWMP program formation and adoption. Discussion topics with local cities included a review of results and identifying pollutants of concern, areas of concern and potential next steps for source tracking and Dry Run/ First Flush monitoring. Cities were also asked to provide any measures or best management practices (BMP's) that have been installed or performed in the city that would account for analysis results. MRSWMP is a regional program comprised of seven local entities including Monterey County. The efforts of each city to reduce and improve stormwater quality has improved the runoff going into the Monterey Bay National Marine Sanctuary.

MBNMS and Coast Guard inspect cruise ship JEWEL OF THE SEA

On October 7, Scott Kathey and a Coast Guard boarding team from Sector San Francisco inspected the M/V JEWEL OF THE SEA, a 962-foot, 90,000 tonne cruise ship operated by Royal Caribbean Cruise Lines, during a port-call to Monterey. Inspection of waste stream logs and waste management spaces below decks detected no compliance violations of sanctuary discharge prohibitions for cruise ships. Vessel management protocols have been established to lock down and tag out overboard waste disposal while transiting through sanctuary waters. MBNMS routinely coordinates with Coast Guard to conduct sporadic unscheduled inspections of cruise ships visiting Monterey to help ensure that cruise lines operating within the sanctuary are aware of stringent sanctuary prohibitions against discharge and pro-actively implement internal shipboard policies/procedures to prevent such discharges within MBNMS.

AWQA Meeting on Agricultural Best Management Practices

The MBNMS agricultural water quality coordinator facilitated an Agricultural Water Quality Alliance (AWQA) meeting with partners interested in improving the effectiveness of Best Management Practices (BMP) for reducing nutrients and sediment from agricultural runoff. Participants also discussed ways to increase the adoption rate of BMPs across multiple kinds of growers. Multiple perspectives present included research organizations, non-profit organizations, government agencies, private consultants and growers. Increasingly sophisticated Best Management Practices are being developed by research organizations and private enterprise. Working together, partners and growers in the region can help improve water quality from agricultural runoff and help reduce pollution from the watersheds that contribute to the Monterey Bay National Marine Sanctuary.

Grazing and Regulations for Ranching and Water Quality

The MBNMS agricultural water quality coordinator attended a workshop to discuss ideas for improving the way grazing lands are regulated in order to improve the sustainability of ranching and improve the water quality from runoff. A cattle rancher told his story managing cattle grazing to improve soil and plant health while turning a profit. Regulators discussed their regulatory priorities and how ranching fits into the big picture. Grazing lands cover a large percent of the land area in watersheds that contribute to the Monterey Bay National Marine Sanctuary. Grazing lands contribute less pollution than most other land uses, making grazing a favorable land use for creating open space and improving water quality entering the MBNMS.

First Flush Training

On October 15th the second of two classroom trainings for First Flush was conducted to train citizen scientists to collect storm drain samples during the first major rainstorm called the First Flush. Training covered information on MBNMS, the Monterey Regional Stormwater Management Program (MRSWMP), First Flush sites and how to conduct First Flush sample collection and field measurements. A total of 41 volunteer citizen scientists have been trained and are now waiting for the rain. This is the 16th year that First Flush monitoring has been conducted along the shore of MBNMS. A data analysis report of the 14 years of First Flush data was conducted which includes 7 years of sampling data prior to and 7 years of sampling data during the MRSWMP program. Data from First Flush aids local cities in determining which watersheds require source tracking or BMP implementation. Volunteers are essential to large scale monitoring programs seeking to collect samples at the same time from many outfalls that are geographically distant. Volunteers also aid in educating and communicating with the community in which they live to prevent urban runoff pollution.

WQPP staff Present at CASQA Conference

WQPP staff Lisa Emanuelson and Pam Krone-Davis presented to over 50 stormwater managers at the annual California Stormwater Quality Association (CASQA) conference held in Monterey CA. The presentation and poster session covered the First Flush monitoring program and the recent data analysis conducted for the Monterey Regional Stormwater

Management Program (MRSWMP) on the 14 years of data from First Flush monitoring and how best to display that data for resource managers. Data from First Flush has shown an improvement between pre-MRSWMP and after MRSWMP was created. Showing other water quality experts and stormwater managers how to conduct monitoring and data analysis will create viable programs that collect long term meaningful storm water data.

Sand Wars Film event draws over 200 people

On November 4th, MBNMS co-hosted an event with the International Ocean Film Festival, and Surfrider at the Middlebury Institute in Monterey to screen the award winning film documentary - "Sand Wars." The event attracted over 200 people who enjoyed a wine and cheese reception, and a screening of the 55-minute film followed by an hour-long panel discussion. Local experts on the panel included Dr Gary Griggs, UC Santa Cruz, Dr Jason Scorse, MIIS, Dr Ed Thornton, NPS retired and they explored the issues surrounding the widely unknown practice of sand mining, it's impact on the environment, and its consequences both locally and globally on neighboring populations. The session was moderated by Bob Battalio with CA Shore and Beach Preservation Association, and the audience was very engaged with many questions for the panel regarding the local sand mining operation and issues of sediment transport in Central California. Community events can promote dialogue on local environmental issues such as coastal erosion.

Grounding of 14-ft Boston Whaler

On November 11, a small recreational boat capsized during fishing operations. The three people on board made it to shore without harm. The owner quickly hired a salvor who carefully pulled the hull over a plywood road across a boulder field at low tide. Damage to submerged lands was minimal. The boat, motor, and all debris were removed the day of the incident. The vessel released less than 10 gallons of gasoline into the surf zone, which quickly dissipated due to surf and bright sun. No significant environmental damage was detected. Quick proactive action by the vessel owner and a salvage plan sensitive to environmental concerns combine to minimize negative resource impacts from such incidents.

EDUCATION, VOLUNTEER AND OUTREACH PROGRAMS

Third annual 2015 Beneath the Waves Film Festival @ Monterey Bay National Marine Sanctuary Exploration Center

Monterey Bay National Marine Sanctuary hosted the 2015 Beneath the Waves Film Festival Santa Cruz at the Sanctuary Exploration Center. Top selected student, amateur and professional films from global artists were screened over a 3-day period. On Thursday evening, September 24th, Dr. Barb Block and Dr. Mary Silver, two notable woman of marine science spoke about things big and small - from amazing bluefin tuna to toxic plankton and their interconnectivity to climate change. Friday, September 25th was family night with engaging activities including fish printing, Jumbo squid dissection, a career panel and youth focused films. Saturday, September 26th was an encore screening of films from the week with numerous MBNMS partners tabling. Groups included: UCSC's Seymour Marine Discovery Center, Surfrider, Save the Whales, Mobileranger.com, PG Museum LiMPETS and MPA Watch. All tolled 947 people came to the three events. The power of short films to inspire the public to protect our world's oceans and national marine sanctuaries is an incredible educational tool and a great use of the immersive theater(s) at the multimedia and interactive Sanctuary Exploration Center.

MBNMS Participates in Open Streets Santa Cruz

On October 11th, MBNMS staff and volunteers participated in the Open Streets Santa Cruz event, which closed West Cliff Drive to cars and opened it for the community to enjoy. MBNMS' booth educated participants on the goals of Monterey Bay Sanctuary and provided awareness of the Exploration Center. Additionally, participants completed a community mural by coloring and adding animals complete with ocean pledges to our kelp forest mural, which is now on display at the Exploration Center. By participating in public outreach events, MBNMS is able to outreach to members of the general public who might not be aware of the existence or goals of the sanctuary. Additionally, it is a great way to provide awareness of the Exploration Center for community members who have not yet visited.

Sanctuary Exploration Center Completes its First Volunteer Guided Tour Training

On September 29th, 12 volunteer docents completed a four-week hands-on training to become tour guides at the Sanctuary Exploration Center. Over the course of the training, lectures and activities introduced new interpretation techniques, group

management techniques, and components of building a successful tour. Also during the training, each tour guide crafted one unique tour outline for adult or general tour. Guided tours are a great way for a class, camp, club or adult group to experience the Sanctuary Exploration Center. Each theme-based guided tour includes: an introduction in the theater, film screening and discussion and presentations at specific exhibits. Guided tours are an excellent way to host groups, classes and camps at the Exploration Center and are a focus to attract visitors during the off-season. Additionally, becoming a tour guide is a way for volunteers to gain additional responsibilities and leadership skills through their volunteerism.

Sanctuary Exploration Center Volunteer Program and Stellar Volunteer nominated for the 2015 “Be The Difference Awards”

The MBNMS Exploration Center Volunteer program was nominated for the 2015 “Be the Difference Awards” sponsored by the Volunteer Center of Santa Cruz County. Sanctuary Exploration Center volunteers are an integral part of achieving the Exploration Center’s and Monterey Bay Sanctuary’ goals. Volunteers interpret exhibits to the public, conduct guided tours, monitor the ocean environment, and participate in events and programs throughout Santa Cruz County. In 2015 over 70 volunteers contributed 5,295 hours of their time interpreting the unique aspects of Monterey Bay Sanctuary and inspiring the conservation of its resources.

Additionally, one of our own volunteer docents, Richard Johnson was nominated as an individual volunteer for his tremendous contribution to the sanctuary and Santa Cruz community. Richard is an inaugural member of the Sanctuary Exploration Center Docent class of June 2012. Since the Exploration Center’s grand opening in July 2012, Richard has become a key member of the Exploration Center team, donating over 750 hours. Richard is the epitome of a team player and is the core of the growing Sanctuary Exploration Center community. We are so grateful to Richard who decided to dip his toes in the sanctuary and take the plunge into marine education. Engaging community members through volunteerism is not only a way to achieve MBNMS and Sanctuary Exploration Center goals, but also empowers stewardship of our sanctuary. These stewards are passionate, dedicated people who have made communicating with and inspiring our visitors an integral part of their lives. This dedication deserves recognition.

Travel Writer Interviews

MBNMS staff conducted two media interviews with Travel Writer Reporters from Luxury Travel Magazine and of Diablo Magazine. We spent about an hour and a half together doing a shoreline and beach walk near Cannery Row and discussed a myriad of topics relevant to tourism including: national marine sanctuaries, healthy oceans, abundant wildlife watching from shore, the Sanctuary Advisory Council & the support of businesses who are ocean stewards, newly discovered species, volunteerism, and the multitude of recreation opportunities along the shore of MBNMS (kayaking, wildlife watching, biking, wine tasting, relaxation, etc). We even saw a whale exhale offshore of San Carlos Beach. I think both reporters enjoyed the ease of conversation & the leisurely walk. MBNMS staff are interested in promoting the importance of special ocean treasures using the existing conduit of luxury travel magazines to bring about improved awareness of MBNMS.

Coastal Discovery Center Docents Celebrated

Coastal Discovery Center docents were honored at an annual October docent appreciation event marking the center’s ninth year of operation. Over the last nine years, the center’s 26 docents have hosted a total of 150,000 visitors, taught over 6,000 students, hosted public events such as Discovery Saturdays, the annual Ocean’s Fair, Earth Day, Coastal Cleanup Day, and Get Into Your Sanctuary Day. Docents also participated in four citizen science programs year-round and have received 4 Volunteer of the Year nominations. They have donated a total of 29,026 hours of their time over the last nine years, equivalent to \$653,000 of paid time. Volunteers are the backbone of education programs and interpretive centers throughout the National Marine Sanctuary System. Recognizing our volunteers through appreciation events is essential towards retainment and fostering positive relationships.

Kayak Concessionaire Honored at Coastal Discovery Center Appreciation Event

Over the last 7 years of operation, Sea For Yourself Kayak Outfitters, located at San Simeon Bay and next to the center, has educated hundreds of visitors by kayak about the kelp forests and marine life of San Simeon Bay, while practicing NOAA’s Marine Wildlife Viewing Guidelines. The owner, Cubby Cashen, was recognized for going above and beyond, teaching people to keep their distance from marine wildlife so seriously that he has pulled kayakers from the water for getting too close to the animals. He is the eyes and ears for San Simeon Bay, and is in constant communication with Monterey Bay Sanctuary staff about recent events and research, which he passes on to his clients. Wildlife harassment is on the rise,

especially by increasing numbers of visiting boaters and kayakers who want to get close to nesting seabirds, sea otters, harbor seals and humpback whales frequenting nearshore waters in the summertime. Sea For Yourself Kayak Outfitters is in the business of turning visitors into stewards, and upholds the mission of MBNMS.

Coastal Discovery Center holds open house for Friends of the Elephant Seal

Twelve members of the education team from Friends of the Elephant Seal attended an open house last Wednesday to learn about the mission of Monterey Bay National Marine Sanctuary, the mission of the Coastal Discovery Center and education programs offered through the center. Volunteers were also lead on a history of San Simeon Bay tour, followed by lunch at historical Sebastian's where ideas were exchanged on ways to further collaborate. Since 1997, Friends of the Elephant Seal volunteers have educated visitors and school programs at the Piedras Blancas elephant seal rookery about 4.5 miles north of San Simeon Bay. Most of the 1,000 students who come to the Coastal Discovery Center each year also partake in the elephant seal school program. The two programs complement one another beautifully. The information session was designed to unite volunteers from FES with those from MBNMS in order to foster an appreciation of common goals and future collaboration between the two groups.

NEWS COVERAGE

[Cruise ship season in Monterey Bay](http://www.montereyherald.com/general-news/20150930/cruise-ship-season-in-monterey-bay)

<http://www.montereyherald.com/general-news/20150930/cruise-ship-season-in-monterey-bay>
Monterey Herald-Sept 30, 2015

[SportsFest returns to Del Monte Beach this weekend](http://www.montereyherald.com/sports/20151001/sportsfest-returns-to-del-monte-beach-this-weekend)

<http://www.montereyherald.com/sports/20151001/sportsfest-returns-to-del-monte-beach-this-weekend>
Monterey Herald-Oct 1, 2015

[Former Secretary of Defense Leon Panetta to open 2015-2016 NJ Speakers Series](http://blog.nj.com/nj_speaker_series/2015/10/former_secretary_of_defense_le.html)

http://blog.nj.com/nj_speaker_series/2015/10/former_secretary_of_defense_le.html
NJ.com-Oct 2, 105

[3,220 Volunteers Collect 8.14 Tons in Annual Coastal Cleanup](http://www.tpgonlinedaily.com/3220-volunteers-collect-8-14-tons-in-annual-coastal-cleanup/)

<http://www.tpgonlinedaily.com/3220-volunteers-collect-8-14-tons-in-annual-coastal-cleanup/>
Aptos Times-Oct 5, 2015

[Richard Svindland: Desalination project makes progress](http://www.montereyherald.com/opinion/20151010/richard-svindland-desalination-project-makes-progress)

<http://www.montereyherald.com/opinion/20151010/richard-svindland-desalination-project-makes-progress>
Monterey Herald-Oct 10, 2015

[Man's friendship with seal leads to children's book](http://www.montereyherald.com/opinion/20151010/richard-svindland-desalination-project-makes-progress)

<http://www.montereyherald.com/opinion/20151010/richard-svindland-desalination-project-makes-progress>
Monterey Herald-Oct 18, 2015

[Animals Spy a New Enemy: Drones](http://www.nytimes.com/2015/10/20/science/animals-spy-a-new-enemy-drones.html?_r=0)

http://www.nytimes.com/2015/10/20/science/animals-spy-a-new-enemy-drones.html?_r=0
New York Times-Oct 19, 2015

[New Images of the Wreckage of USS Macon](http://maritime-executive.com/article/new-images-of-the-wreckage-of-uss-macon)

<http://maritime-executive.com/article/new-images-of-the-wreckage-of-uss-macon>
The Maritime Executive-Oct 19, 2015

[Marine meetings in Cambria](#)

<http://www.sanluisobispo.com/news/local/community/cambrian/article40680237.html>
The Tribune-Oct 21, 2015

[Deep Water Desal environmental review consultant named; worked on major desal projects](#)

<http://www.montereyherald.com/article/NF/20151021/NEWS/151029955>
Monterey Herald-Oct 21, 2015

[Climate of opinion – An Irishwoman’s Diary on California’s crazy weather](#)

<http://www.irishtimes.com/opinion/climate-of-opinion-an-irishwoman-s-diary-on-california-s-crazy-weather-1.2404023>
The Irish Times-Oct 26, 2015

[Kayaker’s hammerhead shark encounter at Leffingwell Landing recalled](#)

<http://www.sanluisobispo.com/news/local/community/cambrian/article41683251.html>
The Tribune-Oct 28, 2015

[Rep. Sam Farr announces retirement](#)

<http://www.santacruzsentinel.com/government-and-politics/20151112/rep-sam-farr-announces-retirement>
Santa Cruz Sentinel-Nov 12, 2015

Web Site (<http://montereybay.noaa.gov/>)

Follow MBNMS on Facebook (<https://www.facebook.com/MBNMS>) and **Twitter** (<https://twitter.com/mbnms>)

*Please take a few moments to peruse the site. Your feedback is greatly appreciated.
Comments and suggestions can be sent to andrew.white@noaa.gov.*

FUN, OCEAN RELATED WEB SITES

Caitlin Seaview Survey

<http://www.catlinseaviewsurvey.com>

SIMON

<http://www.sanctuariesimon.org>

Seasons in the Sea

<http://www.seasonsintthesea.com>

Waterlust

<http://www.waterlust.org/about/>

Thank You Ocean

<http://www.thankyouocean.org/>

NOAA Online Media Library

<http://sanctuaries.noaa.gov/photos>

Oceans Live

<http://oceanslive.gso.uri.edu/>

Office of National Marine Sanctuaries

<http://www.sanctuaries.nos.noaa.gov/>

NOAA Ocean Explorer

<http://oceanexplorer.noaa.gov/>

Encyclopedia of the Sanctuaries

<http://www.ocean.com/Library/Encyclopedia/>

National Data Buoy Center

<http://www.ndbc.noaa.gov/rmd.shtml>

National Ocean Service

<http://www.nos.noaa.gov/>

National Oceanic & Atmospheric Administration

<http://www.noaa.gov/>

Your Sanctuary TV

<http://yoursanctuarytv.org/>

MBNMS STAFF

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Dawn Hayes – Deputy Superintendent

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Erica Burton – Research Specialist
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Chelsea Prindle – Education Specialist
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Catherine Drake – Program Assistant (SEC)
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Learn More About Your Sanctuary

The Sanctuary Office Report is produced bi-monthly by Monterey Bay National Marine Sanctuary staff in conjunction with Sanctuary Advisory Council meetings. To learn more about the Sanctuary please visit our web site at: <http://www.montereybay.noaa.gov>.

To learn more about the Sanctuary Advisory Council please visit:
<http://montereybay.noaa.gov/sac/advisory.html>

The Office of National Marine Sanctuaries

Monterey Bay National Marine Sanctuary is one of 14 marine protected areas in the National Marine Sanctuary System encompassing more than 150,000 square miles of marine and Great Lakes waters from Washington State to the Florida Keys, and from Lake Huron to American Samoa. The system includes 13 national marine sanctuaries and the Papahānaumokuākea Marine National Monument. Visit the ONMS web site at:
<http://www.sanctuaries.nos.noaa.gov/>

Get involved and stay informed!

To learn how to get involved in the Sanctuary visit:
<http://montereybay.noaa.gov/getinvolved/welcome.html>

Sign up for the MBNMS listserv to receive email notices about upcoming Sanctuary events, and public meetings of the Sanctuary Advisory Council and Working Groups:
<http://montereybay.noaa.gov/intro/elists.html>

- Contact Information -

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